

Kotlin - While Loop

Kotlin **while** loop executes its body continuously as long as the specified condition is **true**.

Kotlin **while** loop is similar to Java while loop.

Syntax

The syntax of the Kotlin **while** loop is as follows:

```
while (condition) {  
    // body of the loop  
}
```

When Kotlin program reaches the while loop, it checks the given **condition**, if given condition is **true** then body of the loop gets executed, otherwise program starts executing code available after the body of the while loop .

Example

Following is an example where the while loop continue executing the body of the loop as long as the counter variable i is greater than 0:

```
fun main(args: Array<String>) {  
    var i = 5;  
    while (i > 0) {  
        println(i)  
        i--  
    }  
}
```

When you run the above Kotlin program, it will generate the following output:

```
5  
4  
3  
2  
1
```

Kotlin do...while Loop

The **do..while** is similar to the while loop with a difference that the this loop will execute the code block once, before checking if the condition is true, then it will repeat the loop as long as the condition is true.

The loop will always be executed at least once, even if the condition is false, because the code block is executed before the condition is tested.

Syntax

The syntax of the Kotlin **do...while** loop is as follows:

```
do{  
    // body of the loop  
}while( condition )
```

When Kotlin program reaches the **do...while** loop, it directly enters the body of the loop and executes the available code before it checks for the given condition. If it finds given condition is true, then it repeats the execution of the loop body and continue as long as the given condition is true.

Example

Following is an example where the do...while loop continue executing the body of the loop as long as the counter variable i is greater than 0:

```
fun main(args: Array<String>) {  
    var i = 5;  
    do{  
        println(i)  
        i--  
    }while(i > 0)  
}
```

When you run the above Kotlin program, it will generate the following output:

```
5  
4  
3  
2  
1
```

Quiz Time (Interview & Exams Preparation)

Q 1 - Which of the following is a loop statement in Kotlin?

- A - for
- B - while
- C - do...while
- D - All of the above

Q 2 - What is difference between while and do...while loops?

- A - while loop is faster than do...while loop
- B - do...while loop is faster than while loop
- C - while loop checks condition before executing its body, where as do...while check the condition after executing its body atleast once.
- D - There is no difference between two types of loops